

Wednesday, December 05, 2012

Luis Vega EA Engineering, Science, and Technology 405 S. Highway 121 Building C, Suite 100 Lewisville, TX 75067-8192

RE: 12224: 1434292 B3

Dear Luis:

Vista GeoScience received 18 sample(s) on 11/20/2012 for the analyses presented in the following report.

Order No.: 1212002

There were no problems with the analyses and all data for associated QC met EPA or laboratory specifications except where noted in the Case Narrative.

If you have any questions regarding these tests results, please feel free to call.

Sincerely,

Digitally signed by Roger Bain

DN: cn=Roger Bain, o=Vista Geoscience, ou, email=rbain@vistageoscience.com, c=US

Date: 2012.12.06 09:06:09 -07'00'

Roger Bain Senior Chemist

Roger Dain

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Case Narrative December 5, 2012 Vista GeoScience Page 2

CLIENT: EA Engineering, Science, and Technology

CASE NARRATIVE Project: 12224: 1434292 B3

Lab Order: 1212002

Samples were received on 11/20/12 from EA Engineering; received Passive Soil Gas Device (PSGD) deployment record, but no chain of custody form.

Samples were analyzed using the methods outlined in the following references: Test Methods for Evaluating Solid Waste, Physical/Chemical Methods, SW846, 3rd Edition.

Calibration - The laboratory instruments are calibrated using method appropriate standards. On each day project samples are analyzed the instrument calibration is verified using a mid level Continuing Calibration Verification (CCV). Calculations are carried out by the data system to compute the actual concentration of analyte in the original sample.

Method Blanks, Trip Blanks and Instrument Blanks - Blanks are analyzed after each initial calibration, continuing calibration verification, and after samples determined to have high concentrations of analytes to verify system cleanliness. Method blanks are analyzed to verify the cleanliness of procedures requiring sample preparation prior to analysis. Trip blanks are prepared by the laboratory and accompany the samples to verify that there was no contamination during transport.

Surrogate Recoveries - Some methods require the addition of surrogate compounds and are monitored to determine the efficacy of the analyte recovery from the sample matrix. In cases where multiple surrogates are added at least one must be recovered within Quality Control limits for the data to be accepted.

Batch QC - Prior to analysis, the project samples are associated with a QC batch. This batch is then prepared and analyzed along with QC samples prepared at the same time and using the same reagents and standards. The QC samples associated with a sample batch may include Method Blanks (MB). The results of the batch QC samples are included in the QC section of the report.

Analyst Comments:

PSGD samples E4, E3.5 and E3.5DUP have trichloroethene reported above the upper linear range of the instrument; the reported values are estimated from TIC data and flagged with an "E". The TIC data was used to estimate the value of trichloroethene, because the amount of analyte on the PSGD saturated the detector. PSGD Trip blank all of the surrogate recoveries were outside of control limits.

Hoge Bain

Digitally signed by Roger Bain DN: cn=Roger Bain, o=Vista Geoscience, ou, email=rbain@vistageoscience.com, c=US Date: 2012.12.06 09:05:45 -07'00'

Roger Bain Senior Chemist

Vista GeoScience PH: 303.277.1694 FAX: 303.278.0104 E-Mail: info@VistaGeoScience.com

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CLIENT: EA Engineering, Science, and Technology
Lab Order: 1212002 Client Sample ID: A3
Tag Number:

 Project:
 12224: 1434292 B3
 Collection Date: 11/19/2012

 Lab ID:
 1212002-001A
 Date Received: 11/20/2012
 Matrix: SOIL GAS

Result	Limit Qual	Units	DF	Date Analyzed
	SW8260B	(ATD/G	C/MS)	Analyst: RB
ND	25	ng	1	11/28/2012
ND	25	ng	1	11/28/2012
ND	25	ng	1	11/28/2012
110	80-120	%REC	1	11/28/2012
22.2	80-120 S	%REC	1	11/28/2012
124	80-120 S	%REC	1	11/28/2012
	ND ND ND 110 22.2	SW8260B ND 25 ND 25 ND 25 110 80-120 22.2 80-120 S	SW8260B (ATD/G ND 25 ng ND 25 ng ND 25 ng 110 80-120 %REC 22.2 80-120 S %REC	SW8260B (ATD/GC/MS) ND 25 ng 1 ND 25 ng 1 ND 25 ng 1 110 80-120 %REC 1 22.2 80-120 \$ %REC 1

Qualifiers: * Value exceeds Maximum Contaminant Level

E Value above quantitation range

J Analyte detected below quantitation limits

S Spike Recovery outside accepted recovery limits

B Analyte detected in the associated Method Blank

H Holding times for preparation or analysis exceeded

CLIENT: EA Engineering, Science, and Technology
Lab Order: 1212002 Client Sample ID: C3
Tag Number:

 Project:
 12224: 1434292 B3
 Collection Date: 11/19/2012

 Lab ID:
 1212002-002A
 Date Received: 11/20/2012
 Matrix: SOIL GAS

Analyses	Result	Limit Qual	Units	DF	Date Analyzed
PSGD BY 8260B MODIFIED		SW8260B	(ATD)/GC/MS)	Analyst: RB
Vinyl chloride	ND	25	ng	1	12/3/2012
cis-1,2-Dichloroethene	ND	25	ng	1	12/3/2012
Trichloroethene	ND	25	ng	1	12/3/2012
Surr: 4-Bromofluorobenzene	97.1	80-120	%REC	1	12/3/2012
Surr: Dibromofluoromethane	91.8	80-120	%REC	1	12/3/2012
Surr: Toluene-d8	125	80-120 S	%REC	1	12/3/2012

Qualifiers: * Value exceeds Maximum Contaminant Level

E Value above quantitation range

J Analyte detected below quantitation limits

S Spike Recovery outside accepted recovery limits

B Analyte detected in the associated Method Blank

H Holding times for preparation or analysis exceeded

CLIENT: EA Engineering, Science, and Technology
Lab Order: 1212002

Client Sample ID: D3.5
Tag Number:

Project: 12224: 1434292 B3 Collection Date: 11/19/2012

Result	Limit Qu	al Units	DF	Date Analyzed
	SW8260	В (л	ATD/GC/MS)	Analyst: RB
ND	25	ng	1	12/3/2012
ND	25	ng	1	12/3/2012
9.2	25 J	ng	1	12/3/2012
112	80-120	%REC	1	12/3/2012
41.4	80-120 S	%REC	1	12/3/2012
107	80-120	%REC	1	12/3/2012
	ND ND 9.2 112 41.4	SW82601 ND 25 ND 25 9.2 25 J 112 80-120 41.4 80-120 S	SW8260B (ND 25 ng ND 25 ng 9.2 25 J ng 112 80-120 %REC 41.4 80-120 S %REC	SW8260B (ATD/GC/MS) ND 25 ng 1 ND 25 ng 1 9.2 25 J ng 1 112 80-120 %REC 1 41.4 80-120 S %REC 1

Qualifiers: * Value exceeds Maximum Contaminant Level

E Value above quantitation range

J Analyte detected below quantitation limits

S Spike Recovery outside accepted recovery limits

B Analyte detected in the associated Method Blank

H Holding times for preparation or analysis exceeded

CLIENT: EA Engineering, Science, and Technology **Client Sample ID:** DE3.5

Lab Order: 1212002 Tag Number:

 Project:
 12224: 1434292 B3
 Collection Date: 11/19/2012

 Lab ID:
 1212002-004A
 Date Received: 11/20/2012
 Matrix: SOIL GAS

Analyses	Result	Limit Qual	Units	DF	Date Analyzed
PSGD BY 8260B MODIFIED		SW8260B	(ATD/	GC/MS)	Analyst: RB
Vinyl chloride	ND	25	ng	1	11/28/2012
cis-1,2-Dichloroethene	ND	25	ng	1	11/28/2012
Trichloroethene	100	25	ng	1	11/28/2012
Surr: 4-Bromofluorobenzene	87.3	80-120	%REC	1	11/28/2012
Surr: Dibromofluoromethane	87.6	80-120	%REC	1	11/28/2012
Surr: Toluene-d8	100	80-120	%REC	1	11/28/2012

Qualifiers: * Value exceeds Maximum Contaminant Level

E Value above quantitation range

J Analyte detected below quantitation limits

S Spike Recovery outside accepted recovery limits

B Analyte detected in the associated Method Blank

H Holding times for preparation or analysis exceeded

CLIENT: EA Engineering, Science, and Technology
Lab Order: 1212002
Client Sample ID: E3.5
Tag Number:

 Project:
 12224: 1434292 B3
 Collection Date: 11/19/2012

 Lab ID:
 1212002-005A
 Date Received: 11/20/2012
 Matrix: SOIL GAS

Analyses	Result	Limit Qua	d Units	DF	Date Analyzed
PSGD BY 8260B MODIFIED		SW8260E	3 (4	ATD/GC/MS)	Analyst: RB
Vinyl chloride	ND	25	ng	1	11/28/2012
cis-1,2-Dichloroethene	ND	25	ng	1	11/28/2012
Trichloroethene	12000	25 E	ng	1	11/28/2012
Surr: 4-Bromofluorobenzene	100	80-120	%REC	1	11/28/2012
Surr: Dibromofluoromethane	43.8	80-120 S	%REC	1	11/28/2012
Surr: Toluene-d8	96.8	80-120	%REC	1	11/28/2012

Qualifiers: * Value exceeds Maximum Contaminant Level

E Value above quantitation range

J Analyte detected below quantitation limits

S Spike Recovery outside accepted recovery limits

B Analyte detected in the associated Method Blank

H Holding times for preparation or analysis exceeded

CLIENT: EA Engineering, Science, and Technology Client Sample ID: E3.5DUP

Lab Order: 1212002 Tag Number:

 Project:
 12224: 1434292 B3
 Collection Date: 11/19/2012

 Lab ID:
 1212002-006A
 Date Received: 11/20/2012
 Matrix: SOIL GAS

Analyses	Result	Limit Qua	l Units	DF	Date Analyzed
PSGD BY 8260B MODIFIED		SW8260B	(ATD/G	iC/MS)	Analyst: RB
Vinyl chloride	ND	25	ng	1	12/3/2012
cis-1,2-Dichloroethene	ND	25	ng	1	12/3/2012
Trichloroethene	9700	25 E	ng	1	12/3/2012
Surr: 4-Bromofluorobenzene	82.3	80-120	%REC	1	12/3/2012
Surr: Dibromofluoromethane	39.9	80-120 S	%REC	1	12/3/2012
Surr: Toluene-d8	94.8	80-120	%REC	1	12/3/2012

Qualifiers: * Value exceeds Maximum Contaminant Level

E Value above quantitation range

J Analyte detected below quantitation limits

S Spike Recovery outside accepted recovery limits

B Analyte detected in the associated Method Blank

H Holding times for preparation or analysis exceeded

CLIENT: EA Engineering, Science, and Technology Client Sample ID: E4
Lab Order: 1212002 Tag Number:

 Project:
 12224: 1434292 B3
 Collection Date: 11/19/2012

 Lab ID:
 1212002-007A
 Date Received: 11/20/2012
 Matrix: SOIL GAS

Result	Limit Qu	al Unit	s DF	Date Analyzed
	SW8260	В	(ATD/GC/MS)	Analyst: RB
ND	25	ng	· 1	12/3/2012
ND	25	ng	1	12/3/2012
2700	25 E	ng	1	12/3/2012
117	80-120	%RE0	1	12/3/2012
70.1	80-120 S	%RE0	C 1	12/3/2012
100	80-120	%RE0	1	12/3/2012
	ND ND 2700 117 70.1	SW8260 ND 25 ND 25 2700 25 E 117 80-120 70.1 80-120 S	SW8260B ND 25 ng ND 25 ng 2700 25 E ng 117 80-120 %REG 70.1 80-120 S %REG	SW8260B (ATD/GC/MS) ND 25 ng 1 ND 25 ng 1 2700 25 E ng 1 117 80-120 %REC 1 70.1 80-120 S %REC 1

Qualifiers: * Value exceeds Maximum Contaminant Level

E Value above quantitation range

J Analyte detected below quantitation limits

S Spike Recovery outside accepted recovery limits

B Analyte detected in the associated Method Blank

H Holding times for preparation or analysis exceeded

CLIENT: EA Engineering, Science, and Technology
Lab Order: 1212002

Client Sample ID: DE4
Tag Number:

 Project:
 12224: 1434292 B3
 Collection Date: 11/19/2012

 Lab ID:
 1212002-008A
 Date Received: 11/20/2012
 Matrix: SOIL GAS

Result	Limit Qual	Units	DF	Date Analyzed
	SW8260B	(ATD/GC/	MS)	Analyst: RB
ND	25	ng	1	11/28/2012
ND	25	ng	1	11/28/2012
110	25	ng	1	11/28/2012
105	80-120	%REC	1	11/28/2012
70.4	80-120 S	%REC	1	11/28/2012
104	80-120	%REC	1	11/28/2012
	ND ND 110 105 70.4	SW8260B ND 25 ND 25 110 25 105 80-120 70.4 80-120 S	SW8260B (ATD/GC/MIND 25 ng ND 25 ng 110 25 ng 105 80-120 %REC 70.4 80-120 S %REC	SW8260B (ATD/GC/MS) ND 25 ng 1 ND 25 ng 1 110 25 ng 1 105 80-120 %REC 1 70.4 80-120 S %REC 1

Qualifiers: * Value exceeds Maximum Contaminant Level

E Value above quantitation range

J Analyte detected below quantitation limits

S Spike Recovery outside accepted recovery limits

B Analyte detected in the associated Method Blank

H Holding times for preparation or analysis exceeded

CLIENT: EA Engineering, Science, and Technology
Lab Order: 1212002 Client Sample ID: D4
Tag Number:

 Project:
 12224: 1434292 B3
 Collection Date: 11/19/2012

 Lab ID:
 1212002-009A
 Date Received: 11/20/2012
 Matrix: SOIL GAS

Result	Limit Qua	l Units	DF	Date Analyzed
	SW8260B	(ATD/	GC/MS)	Analyst: RB
ND	25	ng	1	12/3/2012
ND	25	ng	1	12/3/2012
ND	25	ng	1	12/3/2012
121	80-120 S	%REC	1	12/3/2012
73.9	80-120 S	%REC	1	12/3/2012
103	80-120	%REC	1	12/3/2012
	ND ND ND 121 73.9	SW8260B ND 25 ND 25 ND 25 121 80-120 S 73.9 80-120 S	SW8260B (ATD/ ND 25 ng ND 25 ng ND 25 ng 121 80-120 S %REC 73.9 80-120 S %REC	SW8260B (ATD/GC/MS) ND 25 ng 1 ND 25 ng 1 ND 25 ng 1 121 80-120 S %REC 1 73.9 80-120 S %REC 1

Qualifiers: * Value exceeds Maximum Contaminant Level

E Value above quantitation range

J Analyte detected below quantitation limits

S Spike Recovery outside accepted recovery limits

B Analyte detected in the associated Method Blank

H Holding times for preparation or analysis exceeded

CLIENT: EA Engineering, Science, and Technology
Lab Order: 1212002

Client Sample ID: C4
Tag Number:

 Project:
 12224: 1434292 B3
 Collection Date: 11/19/2012

 Lab ID:
 1212002-010A
 Date Received: 11/20/2012
 Matrix: SOIL GAS

Analyses	Result	Limit (Qual	Units	DF	Date Analyzed
PSGD BY 8260B MODIFIED		SW826	60B	(ATD/	GC/MS)	Analyst: RB
Vinyl chloride	ND	25		ng `	1	11/28/2012
cis-1,2-Dichloroethene	ND	25		ng	1	11/28/2012
Trichloroethene	ND	25		ng	1	11/28/2012
Surr: 4-Bromofluorobenzene	76.7	80-120	S	%REC	1	11/28/2012
Surr: Dibromofluoromethane	0	80-120	S	%REC	1	11/28/2012
Surr: Toluene-d8	97.6	80-120		%REC	1	11/28/2012

Qualifiers: * Value exceeds Maximum Contaminant Level

E Value above quantitation range

J Analyte detected below quantitation limits

S Spike Recovery outside accepted recovery limits

B Analyte detected in the associated Method Blank

H Holding times for preparation or analysis exceeded

CLIENT: EA Engineering, Science, and Technology
Lab Order: 1212002

Client Sample ID: B4
Tag Number:

 Project:
 12224: 1434292 B3
 Collection Date: 11/19/2012

 Lab ID:
 1212002-011A
 Date Received: 11/20/2012
 Matrix: SOIL GAS

Result	Limit Qua	Units	DF	Date Analyzed
	SW8260B	(ATI	D/GC/MS)	Analyst: RB
ND	25	ng	1	11/28/2012
ND	25	ng	1	11/28/2012
ND	25	ng	1	11/28/2012
102	80-120	%REC	1	11/28/2012
35.6	80-120 S	%REC	1	11/28/2012
129	80-120 S	%REC	1	11/28/2012
	ND ND ND 102 35.6	SW8260B ND 25 ND 25 ND 25 102 80-120 35.6 80-120 S	SW8260B (ATI ND 25 ng ND 25 ng ND 25 ng 102 80-120 %REC 35.6 80-120 \$ %REC	SW8260B (ATD/GC/MS) ND 25 ng 1 ND 25 ng 1 ND 25 ng 1 102 80-120 %REC 1 35.6 80-120 S %REC 1

Qualifiers: * Value exceeds Maximum Contaminant Level

E Value above quantitation range

J Analyte detected below quantitation limits

S Spike Recovery outside accepted recovery limits

B Analyte detected in the associated Method Blank

H Holding times for preparation or analysis exceeded

CLIENT: EA Engineering, Science, and Technology
Lab Order: 1212002 Client Sample ID: A4
Tag Number:

 Project:
 12224: 1434292 B3
 Collection Date: 11/19/2012

 Lab ID:
 1212002-012A
 Date Received: 11/20/2012
 Matrix: SOIL GAS

Result	Limit Qual	Units	DF	Date Analyzed
	SW8260B	(ATD/GC/	MS)	Analyst: RB
ND	25	ng	1	11/28/2012
ND	25	ng	1	11/28/2012
ND	25	ng	1	11/28/2012
87.5	80-120	%REC	1	11/28/2012
33.7	80-120 S	%REC	1	11/28/2012
100	80-120	%REC	1	11/28/2012
	ND ND ND 87.5 33.7	SW8260B ND 25 ND 25 ND 25 87.5 80-120 33.7 80-120 S	SW8260B (ATD/GC/ ND 25 ng ND 25 ng ND 25 ng 87.5 80-120 %REC 33.7 80-120 S **REC **REC	SW8260B (ATD/GC/MS) ND 25 ng 1 ND 25 ng 1 ND 25 ng 1 87.5 80-120 %REC 1 33.7 80-120 \$ %REC 1

Qualifiers: * Value exceeds Maximum Contaminant Level

E Value above quantitation range

J Analyte detected below quantitation limits

S Spike Recovery outside accepted recovery limits

B Analyte detected in the associated Method Blank

H Holding times for preparation or analysis exceeded

CLIENT: EA Engineering, Science, and Technology **Client Sample ID:** D4.5

Lab Order: 1212002 Tag Number:

 Project:
 12224: 1434292 B3
 Collection Date: 11/19/2012

 Lab ID:
 1212002-013A
 Date Received: 11/20/2012
 Matrix: SOIL GAS

Result	Limit Qua	l Units	DF	Date Analyzed
	SW8260E	(AT	D/GC/MS)	Analyst: RB
ND	25	ng	1	11/28/2012
ND	25	ng	1	11/28/2012
ND	25	ng	1	11/28/2012
122	80-120 S	%REC	1	11/28/2012
59.6	80-120 S	%REC	1	11/28/2012
103	80-120	%REC	1	11/28/2012
	ND ND ND 122 59.6	SW8260B ND 25 ND 25 ND 25 122 80-120 S 59.6 80-120 S	SW8260B (AT ND 25 ng ND 25 ng ND 25 ng 122 80-120 S %REC 59.6 80-120 S %REC	SW8260B (ATD/GC/MS) ND 25 ng 1 ND 25 ng 1 ND 25 ng 1 122 80-120 S %REC 1 59.6 80-120 S %REC 1

Qualifiers: * Value exceeds Maximum Contaminant Level

E Value above quantitation range

J Analyte detected below quantitation limits

S Spike Recovery outside accepted recovery limits

B Analyte detected in the associated Method Blank

H Holding times for preparation or analysis exceeded

CLIENT: EA Engineering, Science, and Technology Client Sample ID: F4
Lab Order: 1212002 Tag Number:

 Project:
 12224: 1434292 B3
 Collection Date: 11/19/2012

 Lab ID:
 1212002-014A
 Date Received: 11/20/2012
 Matrix: SOIL GAS

Analyses	Result	Limit Qua	l Units	DF	Date Analyzed
PSGD BY 8260B MODIFIED		SW8260B	(ATD	/GC/MS)	Analyst: RB
Vinyl chloride	ND	25	ng	1	11/28/2012
cis-1,2-Dichloroethene	ND	25	ng	1	11/28/2012
Trichloroethene	ND	25	ng	1	11/28/2012
Surr: 4-Bromofluorobenzene	71.5	80-120 S	%REC	1	11/28/2012
Surr: Dibromofluoromethane	65.4	80-120 S	%REC	1	11/28/2012
Surr: Toluene-d8	87.1	80-120	%REC	1	11/28/2012

Qualifiers: * Value exceeds Maximum Contaminant Level

E Value above quantitation range

J Analyte detected below quantitation limits

S Spike Recovery outside accepted recovery limits

B Analyte detected in the associated Method Blank

H Holding times for preparation or analysis exceeded

CLIENT: EA Engineering, Science, and Technology
Lab Order: 1212002 Client Sample ID: G4
Tag Number:

 Project:
 12224: 1434292 B3
 Collection Date: 11/19/2012

 Lab ID:
 1212002-015A
 Date Received: 11/20/2012
 Matrix: SOIL GAS

Result	Limit Qual	Units	DF	Date Analyzed
	SW8260B	(ATD/G	C/MS)	Analyst: RB
ND	25	ng	1	12/3/2012
ND	25	ng	1	12/3/2012
ND	25	ng	1	12/3/2012
125	80-120 S	%REC	1	12/3/2012
86.6	80-120	%REC	1	12/3/2012
109	80-120	%REC	1	12/3/2012
	ND ND ND 125 86.6	SW8260B ND 25 ND 25 ND 25 125 80-120 S 86.6 80-120	SW8260B (ATD/G ND 25 ng ND 25 ng ND 25 ng 125 80-120 S %REC 86.6 80-120 %REC	SW8260B (ATD/GC/MS) ND 25 ng 1 ND 25 ng 1 ND 25 ng 1 125 80-120 \$ REC 1 86.6 80-120 \$ REC 1

Qualifiers: * Value exceeds Maximum Contaminant Level

E Value above quantitation range

J Analyte detected below quantitation limits

S Spike Recovery outside accepted recovery limits

B Analyte detected in the associated Method Blank

H Holding times for preparation or analysis exceeded

CLIENT: EA Engineering, Science, and Technology Client Sample ID: G4DUP

Lab Order: 1212002 Tag Number:

 Project:
 12224: 1434292 B3
 Collection Date: 11/19/2012

 Lab ID:
 1212002-016A
 Date Received: 11/20/2012
 Matrix: SOIL GAS

Analyses	Result	Limit Qual	Units	DF	Date Analyzed
PSGD BY 8260B MODIFIED		SW8260B	(ATD	(GC/MS)	Analyst: RB
Vinyl chloride	ND	25	ng	1	12/3/2012
cis-1,2-Dichloroethene	ND	25	ng	1	12/3/2012
Trichloroethene	ND	25	ng	1	12/3/2012
Surr: 4-Bromofluorobenzene	79.7	80-120 S	%REC	1	12/3/2012
Surr: Dibromofluoromethane	25.9	80-120 S	%REC	1	12/3/2012
Surr: Toluene-d8	103	80-120	%REC	1	12/3/2012

Qualifiers: * Value exceeds Maximum Contaminant Level

E Value above quantitation range

J Analyte detected below quantitation limits

S Spike Recovery outside accepted recovery limits

B Analyte detected in the associated Method Blank

H Holding times for preparation or analysis exceeded

CLIENT: EA Engineering, Science, and Technology
Lab Order: 1212002

Client Sample ID: G3
Tag Number:

 Project:
 12224: 1434292 B3
 Collection Date: 11/19/2012

 Lab ID:
 1212002-017A
 Date Received: 11/20/2012
 Matrix: SOIL GAS

Result	Limit Qual	Units	DF	Date Analyzed		
	SW8260B (ATD/GC/M		MS)	Analyst: RB		
ND	25	ng .	1	12/3/2012		
ND	25	ng	1	12/3/2012		
ND	25	ng	1	12/3/2012		
135	80-120 S	%REC	1	12/3/2012		
96.2	80-120	%REC	1	12/3/2012		
95.0	80-120	%REC	1	12/3/2012		
	ND ND ND 135 96.2	SW8260B ND 25 ND 25 ND 25 135 80-120 S 96.2 80-120	SW8260B (ATD/GC/MED) ND 25 ng ND 25 ng ND 25 ng 135 80-120 S %REC 96.2 80-120 %REC	SW8260B (ATD/GC/MS) ND 25 ng 1 ND 25 ng 1 ND 25 ng 1 135 80-120 S %REC 1 96.2 80-120 %REC 1		

Qualifiers: * Value exceeds Maximum Contaminant Level

E Value above quantitation range

J Analyte detected below quantitation limits

S Spike Recovery outside accepted recovery limits

B Analyte detected in the associated Method Blank

H Holding times for preparation or analysis exceeded

CLIENT: EA Engineering, Science, and Technology Client Sample ID: Trip Blank

Lab Order: 1212002 Tag Number:

 Project:
 12224: 1434292 B3
 Collection Date: 11/19/2012

 Lab ID:
 1212002-018A
 Date Received: 11/20/2012
 Matrix: SOIL GAS

Analyses	Result	Limit Qu	ıal Ur	nits	DF	Date Analyzed
PSGD BY 8260B MODIFIED		SW8260	В	(ATD/GC	/MS)	Analyst: RB
Vinyl chloride	ND	25	ng	-	1	11/28/2012
cis-1,2-Dichloroethene	ND	25	ng		1	11/28/2012
Trichloroethene	ND	25	ng		1	11/28/2012
Surr: 4-Bromofluorobenzene	70.5	80-120	S %F	REC	1	11/28/2012
Surr: Dibromofluoromethane	2.88	80-120	S %F	REC	1	11/28/2012
Surr: Toluene-d8	75.2	80-120	S %F	REC	1	11/28/2012

Qualifiers: * Value exceeds Maximum Contaminant Level

E Value above quantitation range

J Analyte detected below quantitation limits

S Spike Recovery outside accepted recovery limits

B Analyte detected in the associated Method Blank

H Holding times for preparation or analysis exceeded

Vista GeoScience 05-Dec-12

Lab Order: 1212002

Client: EA Engineering, Science, and Technology

Project: 12224: 1434292 B3

Sample ID	Client Sample ID	Collection Date	Matrix	Test Name	TCLP Date	Prep Date	Analysis Date
1212002-001A	A3	11/19/2012	PSGD	PSGD by 8260B modified		11/28/2012	11/28/2012
1212002-002A	C3			PSGD by 8260B modified		12/3/2012	12/3/2012
1212002-003A	D3.5			PSGD by 8260B modified		12/3/2012	12/3/2012
1212002-004A	DE3.5			PSGD by 8260B modified		11/28/2012	11/28/2012
1212002-005A	E3.5			PSGD by 8260B modified		11/28/2012	11/28/2012
1212002-006A	E3.5DUP			PSGD by 8260B modified		12/3/2012	12/3/2012
1212002-007A	E4			PSGD by 8260B modified		12/3/2012	12/3/2012
1212002-008A	DE4			PSGD by 8260B modified		11/28/2012	11/28/2012
1212002-009A	D4			PSGD by 8260B modified		12/3/2012	12/3/2012
1212002-010A	C4			PSGD by 8260B modified		11/28/2012	11/28/2012
1212002-011A	B4			PSGD by 8260B modified		11/28/2012	11/28/2012
1212002-012A	A4			PSGD by 8260B modified		11/28/2012	11/28/2012
1212002-013A	D4.5			PSGD by 8260B modified		11/28/2012	11/28/2012
1212002-014A	F4			PSGD by 8260B modified		11/28/2012	11/28/2012
1212002-015A	G4			PSGD by 8260B modified		12/3/2012	12/3/2012
1212002-016A	G4DUP			PSGD by 8260B modified		12/3/2012	12/3/2012
1212002-017A	G3			PSGD by 8260B modified		12/3/2012	12/3/2012
1212002-018A	Trip Blank			PSGD by 8260B modified		11/28/2012	11/28/2012

DATES REPORT

CLIENT: EA Engineering, Science, and Technology

ANALYTICAL QC SUMMARY REPORT

Work Order: 1212002

Project: 12224: 1434292 B3 **TestCode:** 8260_V_L

Sample MB-1431 Client ID: ZZZZZ	SampTyp MBLK Batch ID: 1431	TestNo: SW8260	•		•	e: 11/28/2012 is 11/28/2012	RunNo: 1629 SeqNo: 17200	
Analyte	Result	PQL SPK value	SPK Ref Val	%REC	LowLimit	HighLimit RPD Ref Val	%RPD RPDLimit	Qual
Vinyl chloride cis-1,2-Dichloroethene Trichloroethene	ND ND ND	25 25 25						
Surr: 4-Bromofluorobenzene	10.04	0 25		40.2	80	120		S
Surr: Dibromofluoromethane	24.27	0 25 0 25		97.1 61.8	80 80	120 120		S
Surr: Toluene-d8	15.45	0 25	U	01.0	80	120		5
Sample MB-1432	SampTyp MBLK	TestCode: 8260_V_	L Units: ng		Prep Date	e: 12/3/2012	RunNo: 1630	
Client ID: ZZZZZ	Batch ID: 1432	TestNo: SW8260	B (ATD/GC/MS)		Analys	is 12/3/2012	SeqNo: 17211	
Analyte	Result	PQL SPK value	SPK Ref Val	%REC	LowLimit	HighLimit RPD Ref Val	%RPD RPDLimit	Qual
				, o. t= 0		· ·		
Vinyl chloride cis-1,2-Dichloroethene Trichloroethene	ND ND ND	25 25 25		75.120		ŭ		
cis-1,2-Dichloroethene	ND	25	0	42.9	80	120		S
cis-1,2-Dichloroethene Trichloroethene	ND ND	25 25	0			120 120 120		S S

Qualifiers: E Value above quantitation range

ND Not Detected at the Reporting Limit

H Holding times for preparation or analysis exceeded

RPD outside accepted recovery limits

J Analyte detected below quantitation limits

S Spike Recovery outside accepted recovery limits

	sta GeoSci				Vapor1	ec [™] Passiv	ve Soil Gas Field Deployment Record
Client:	FA Engher 405. S. H.	Jna Schuce	and Technol	054	Date: 11/0	3/2012	PAGE / OF
Addres	: 405.5, H	WV 121, C-1	00	3/	Client Project Mana	ger: Luis	Vega Client Project #: 1434292 B3 Court GW Plume Size
Lei	Wisuille ,TX	75067			Project/Site Name:	Circle	Court GW Plume Site
Phone:	972-315-	3922 Fax:	972-315-	5181	Project/Siite Addres		
E-Mail:	972-315- 1 vega @ 20	rest, com	Fax E-Mail Pre	lim Results	Lab Project	#:	
	MPLE INFORMA				Malott	Sample	er Signature: Um & Mal III
	Field Sample iD	Date Emplaced	Date Retrieved	Depth	Coordi		X,Y Coordinate System Datum
		Time Emplaced	Time Retrieved		X	Υ	Field Notes: surface conditions, soil type, weather conditions, etc.
	A3	2:14	0945	6"			matan soil
	(3	2117	1009	6"			1°C II
	D 3, 5	2:18	1036	6"			(1) .
	DE 3.5	2:19	1043 NA	6"			, XX VI
	03	2:20		611			in Didnot rutorer
	53.3	2:21	1048	6"			()
	83,5 Dup	2:23	1049	6"			12 1
	EY	2125	1057	6"			11 4
	DE, A	2127	1054	6"			IC II
	D4	2128	1034	6"			م ۱۱
	04	2:29	1011	6"			K U
	B4'	2:30	1001	6"			1 0
	AY	2:31	0949	6"			K U
	DY:5	2132	1032	611			K Y
	F4	2!33	1110	6"			n 11
	64	2:34	1117	6"			n h
	64 DOD	2135	1112	6"			N IJ
	63	2:37	1119	6"			W 11
			,				
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			-	-			
					20.0011.00	ATT 400 : TATE	200 270 2004 - 5 - 1/4 - 4 - 2 - 2 - 1
	Vista	GeoScience LLC • 13	30 Capital Drive, Sui	re C • Golde	n, CO 80401 • 303.	2/7.1694 • FAX:	303.278.0104 • E-mail: Lab@VistaGeoScience.com